

Amendments to the Claims:

This listing of claims will replace all prior versions and listings of claims in the application.

Listing of Claims:

Claims 1-21 (canceled)

Claim 22 (currently amended): An expression vector comprising a polynucleotide encoding an AT hook transcription factor polypeptide, wherein the polynucleotide hybridizes to a nucleic acid sequence comprising SEQ ID NO: 13 under stringent conditions;

said stringent conditions comprise two wash steps of 10 to 30 minutes with 6x SSC and 65° C or greater stringency;

wherein the polypeptide comprises a conserved domain that is at least 65% identical in its amino acid sequence to amino acids 106-201 of SEQ ID NO: 14; and

a transformed plant that comprises the expression vector and overexpresses the polypeptide has greater biomass or more tolerance to water deficit than a control plant.

Claim 23 (previously presented): The expression vector of claim 22, wherein the stringent conditions comprise two wash steps of 0.5X SSC, 0.1% SDS at 65° C for 10 to 30 minutes.

Claim 24 (previously presented): The expression vector of claim 22, wherein the stringent conditions comprise two wash steps of 0.1X SSC, 0.1% SDS at 65° C for 30 minutes.

Claim 25 (currently amended): The expression vector of claim 22, wherein the transcription factor polypeptide comprises a conserved domain that is at least ~~63%~~ 71% identical in its amino acid sequence to a second conserved domain consisting of amino acids 106-201 of SEQ ID NO: 14.

Claim 26 (previously presented): The expression vector of claim 22, wherein the expression vector is comprised within a host plant cell.

Claim 27 (currently amended): A transgenic plant comprising a recombinant polynucleotide comprising a nucleotide sequence encoding an AT-hook transcription factor polypeptide, wherein:
the recombinant polynucleotide hybridizes to a nucleic acid sequence comprising SEQ ID NO: 13

under stringent conditions;

said stringent conditions comprise two wash steps of 10 to 30 minutes with 6x SSC and 65° C or greater stringency;

wherein the AT-hook transcription factor polypeptide comprises a conserved domain that is at least 65% identical in its amino acid sequence to amino acids 106-201 of SEQ ID NO: 14; and

the transgenic plant overexpresses the polypeptide and has greater biomass or more tolerance to water deficit conditions than a control plant.

Claim 28 (previously presented): The transgenic plant of claim 27, wherein the stringent conditions comprise two wash steps of 0.5X SSC, 0.1% SDS at 65° C for 10 to 30 minutes.

Claim 29 (previously presented): The transgenic plant of claim 27, wherein the stringent conditions comprise two wash steps of 0.1X SSC, 0.1% SDS at 65° C for 30 minutes.

Claim 30 (currently amended): The transgenic plant of claim 27, wherein the transcription factor polypeptide comprises a conserved domain that is at least ~~63%~~ 71% identical in its amino acid sequence to a second conserved domain consisting of amino acids 106-201 of SEQ ID NO: 14.

Claim 31 (previously presented): The transgenic plant of Claim 27, wherein the recombinant polynucleotide comprises a constitutive, inducible, or tissue-specific promoter operably linked to said nucleotide sequence.

Claim 32 (currently amended): A method for producing a transgenic plant having increased biomass as compared to a control plant, the method steps comprising:

(a) providing an expression vector comprising:

(i) a polynucleotide sequence comprising a nucleotide sequence that hybridizes to a nucleic acid sequence comprising SEQ ID NO: 13 under stringent conditions;

said stringent conditions comprise two wash steps of 10 to 30 minutes with 6x SSC and 65° C or greater stringency; and

(ii) one or more regulatory elements flanking the polynucleotide sequence, said one or more regulatory elements controlling expression of said nucleotide sequence in the transgenic plant;

(b) introducing the expression vector into a plant cell; and

(c) growing the plant cell into the transgenic plant, wherein the transgenic plant overexpresses an AT-hook transcription factor polypeptide, the AT-hook transcription factor polypeptide comprises a conserved domain that is at least 65% identical in its amino acid sequence to amino acids 106-201 of SEQ ID NO: 14; and the transgenic plant has increased biomass as compared to the control plant.

Claim 33 (previously presented): The method of Claim 32, the method steps further comprising:

(d) selfing or crossing said transgenic plant with increased biomass with itself or another plant, respectively, to produce transgenic seed; and

(e) growing a progeny plant from the transgenic seed, thus producing a transgenic progeny plant having increased biomass as compared to the control plant.

Claim 34 (previously presented): The method of claim 32, wherein the stringent conditions comprise two wash steps of 0.5X SSC, 0.1% SDS at 65° C for 10 to 30 minutes.

Claim 35 (previously presented): The method of claim 32, wherein the stringent conditions comprise two wash steps of 0.1X SSC, 0.1% SDS at 65° C for 30 minutes.

Claim 36 (currently amended): The method of claim 32, wherein the transcription factor polypeptide comprises a conserved domain that is at least ~~63%~~ 71% identical in its amino acid sequence to a second conserved domain consisting of amino acids 106-201 of SEQ ID NO: 14.

Claim 37 (currently amended): A method for producing a transgenic plant having more tolerance to water deficit conditions as compared to a control plant, the method steps comprising:

(a) providing an expression vector comprising:

(i) a polynucleotide sequence comprising a nucleotide sequence that hybridizes to a nucleic acid sequence comprising SEQ ID NO: 13 under stringent conditions;

said stringent conditions comprising two wash steps of 6x SSC and 65° C or greater stringency for 10 to 30 minutes; and

(ii) one or more regulatory elements flanking the polynucleotide sequence, said one or more regulatory elements controlling expression of said nucleotide sequence in the transgenic plant;

(b) introducing the expression vector into a plant cell; and

(c) growing the plant cell into the transgenic plant, wherein the transgenic plant overexpresses an AT-hook transcription factor polypeptide, the AT-hook transcription factor polypeptide comprises a conserved domain that is at least 65% identical in its amino acid sequence to amino acids 106-201 of SEQ ID NO: 14; and the transgenic plant has more tolerance to water deficit conditions as compared to the control plant.

Claim 38 (previously presented): The method of Claim 37, the method steps further comprising:

(d) selfing or crossing said transgenic plant with more tolerance to water deficit conditions with itself or another plant, respectively, to produce transgenic seed; and

(e) growing a progeny plant from the transgenic seed, thus producing a transgenic progeny plant having more tolerance to water deficit conditions as compared to the control plant.

Claim 39 (previously presented): The method of claim 37, wherein the stringent conditions comprise two wash steps of 0.5X SSC, 0.1% SDS at 65° C for 10 to 30 minutes.

Claim 40 (previously presented): The method of claim 37, wherein the stringent conditions comprise two wash steps of 0.1X SSC, 0.1% SDS at 65° C for 30 minutes.

Claim 41 ((previously presented): The method of claim 37, wherein the transcription factor polypeptide comprises a conserved domain that is at least 63% identical in its amino acid sequence to a second conserved domain consisting of amino acids 106-201 of SEQ ID NO: 14.

Claim 42 (previously presented): A transgenic seed comprising the expression vector of Claim 22.

Claim 43 (new): An expression vector comprising a polynucleotide encoding an AT hook transcription factor polypeptide, wherein the polynucleotide comprises SEQ ID NO: 13; and a transformed plant that comprises the expression vector and overexpresses the polypeptide has greater biomass or more tolerance to water deficit than a control plant.

Claim 44 (new): The expression vector of claim 43, wherein the expression vector is comprised